

## GREAT CURASSOW

BY GEORGE MIKSCH SUTTON

SIXTY-SOME kilometers south of Victoria, Tamaulipas, the Mexico City highway crosses a beautiful stream, the Río Sabinas. West of the bridge a few miles rises the first foothill of the great Sierra Madre Oriental. The foothill is heavily forested; but the careful observer will note, well up the slope, a patch of naked, red-tinted rock, and at about the same level, a little to the north, a white cloud which seems to be caught in the trees. Under this cloud-banner—or, indeed, in it, for it clings to the slope much of the time—grow huge “jobo-plum” trees (probably *Spondias mombin*) whose uppermost branches bear thousands of yellow-orange “plums” in March and April. On this fruit feeds a remarkable bird, the Great Curassow (*Crax rubra*). The lofty trees are a favorite haunt of another cracid, the Crested Guan (*Penelope purpurascens*), and off to the north and east a few miles, in brushy, comparatively dry “mesa country,” lives a third big galliform bird, the Wild Turkey (*Meleagris gallopavo*). These forms have survived principally because so few people living thereabouts have owned firearms. They probably will continue to survive, despite the proximity of the highway, if the traffic will be good enough to keep on moving.

The Río Sabinas is near the north edge of the Great Curassow's range. The species inhabits heavy tropical woodland southward through Middle America and western Colombia as far as western Ecuador (Peters, 1934. “Check List of Birds of the World,” 2:12). A small race is endemic to Cozumel Island, off the coast of Yucatán. In southern Tamaulipas, where *Crax rubra* is found up to at least 3300 feet elevation, the bird is known as the *Faisán Real* (Royal Pheasant). In some parts of México, and in Guatemala, it is called the *Pahuil* (Salvin and Godman, 1897. “Biologia Centrali-Americana,” Aves, 3:272), a name which strikes me as being a local version of *Pavo real*, the name used in Panamá (Aldrich and Bole, 1937. *Sci. Publ. Cleveland Mus. Nat. Hist.*, 7:53). Wetmore (1943. *Proc. U. S. Nat. Mus.*, 93:243) states that in one area of southern Veracruz the bird's name is *Cholin*.

The adult male Great Curassow is black with white belly, flanks, and under tail coverts. The black is faintly glossed with dark green and blue. The stiff, narrow crest feathers, each strongly recurved at the tip, give the head a fantastically tousled appearance when the bird is excited. The heavy bill is ornamented at the base with a yellow knob which swells and brightens at the height of the courtship season. The iris is dark brown. Young males are female-like in color for a time just after the post-natal molt, but they become boldly black and white long before reaching full size. A young male in my

collection, taken by Paul S. Martin in southwestern Tamaulipas on March 26, 1949, is much like an adult male except that it is decidedly small, its crest feathers are only slightly recurved, it has no bill-knob (label comments indicate that the cere was "bright yellow"), the feathers of the chin and throat are dull white basally, and there are a few brown- and gray-edged feathers among the greenish black feathers of the chest and upper belly.

In several adult male Tamaulipas specimens which I have handled in the flesh, the bill-knob has been large and almost spherical. The male shown in Sturgis (1928. "Field Book of the Birds of the Panama Canal Zone," opp. p. 26) has no bill-knob whatsoever, so either the bird was young or the photograph was taken at some season other than the breeding season.

The adult female is brown, without white on the belly and crissum, but with crest even more bizarre than that of the male in that it is black and white. The color of the upper parts is highly variable. Concerning this variability Sclater and Salvin (*Proc. Zool. Soc. London*, 1870:514) say: "In some specimens the wings are wholly red, in others much banded with black and cinnamonous; in some specimens also the tail-bands are very slight, and almost evanescent. The upper portion of the back varies from black to chestnut." Friedmann (1946. *U. S. Nat. Mus. Bull.* 50, part 10:15) calls attention to the interesting fact that all specimens of the barred-backed "*chapmani* Nelson" form known to him have come from Campeche and Yucatán.

The sound produced by the male Great Curassow during courtship is simple but impressive. It has the muffled quality of a distant explosion. The individual whose portrait we present here produced a sound which I have set down as *oomh* (Sutton, 1951. "Mexican Birds," pp. 164-165). I use the word *sound* rather than *callnote* because I do not know to what extent the *oomh* is really vocal. The neck-skin of a courting male which I collected along the Río Sabinas on March 15, 1941, was thick and flabby, the muscular subcutaneous tissues being supplied with a considerable network of blood vessels. Such apparatus clearly indicates that the explosive quality of the *oomh* might result from a sudden releasing or powerful expulsion of a neckful of air. Salvin and Godman (*loc. cit.*) liken this sound to "the distant roaring of the 'tiger'." Cries of parent birds, excited over possible danger to their young, include "screams, peculiar grunts, and wails" (Sutton and Pettingill, 1942. *Auk*, 59:11).

All species of the family Cracidae are known to be arboreal, but the Great Curassows I have observed in southern Tamaulipas have certainly spent less time in trees than the Crested Guans of the same areas. Salvin and Godman (*loc. cit.*) say that in the morning and evening *Crax rubra* is "usually found perched upon trees and feeding on fruit, but during the day [it] spends its time chiefly on the ground scratching in the leaves for food . . ." As for

*Penelope purpurascens*, I have only very rarely seen it on the ground; *Crax rubra* I have seen on the ground several times, notably on March 21, 1941, when a female, near her nest or accompanied by small young, ran back and forth through the brush calling *kwut, kwut*, and giving a thin, penetrating squeal. Dickey and van Rossem (1938. *Field Mus. Nat. Hist. Zool. Ser.* 23: 147), writing of El Salvador, tell of surprising a dozen females and young which, instead of taking wing, all trotted into cover of the swamp in the manner of turkeys. These authors describe the flight of *Crax rubra* as "alternate flapping and sailing," the wing-beats as "powerful and rather slow."

The Great Curassow's nest is an unsubstantial, unshapely, disproportionately small structure of leaves, twigs, or a mixture of the two, placed in deep woods, but not very far from the ground. A nest found by the Cornell University-Carleton College Expedition near Gómez Farías, Tamaulipas, on March 17, 1941, was in a "vine-covered clump of slender trees . . . twenty feet from the ground. Here the female was incubating. From far up the slope we could see her dark tail and tousled crest" (Sutton and Pettingill, *loc. cit.*). The eggs, which are large, white, and rounded rather than pointed, usually number two.

The newly hatched chick, which I have never seen, has been figured by Heinroth (1931. *Journ. für Ornith.*, 79, opp. p. 282) as warm grayish buff, with white chin, throat, and belly, marked with black or deep chestnut on the head, neck, back and wings. Eggs are often taken from the nests by the Mexicans and hatched under domestic hens. The chicks grow up tame. I have seen two such pets, fully matured, walking sedately about in front of a fine home on the outskirts of Monterrey, Nuevo León.

R. I. Pocock (1908. *Avicultural Mag.*, 7:23-30) reports the breeding in captivity (in England) of a pair of Great Curassows. The nest, of willow twigs, was built solely by the male. The young, which were remarkably precocial, were fed by the female.

For many years I have been puzzled by the beautiful Fuertes drawing of a curassow illustrating his famous paper on the voices of tropical birds (1918. *Bird-Lore*, 16:427). When I first became acquainted with *Crax rubra* in southwestern Tamaulipas, I thought that Fuertes's drawing of the Colombian bird represented a male *rubra* with undeveloped bill-knob. I now feel quite sure that his model was an adult *Crax nigra*, probably a female, since the only specimen of *nigra* listed by Chapman (1907. *Bull. Amer. Mus. Nat. Hist.*, 36:194) is a female from Buena Vista, Colombia, the very locality at which Fuertes reported hearing a "Black Curassow."